



Chemila, spol. s r.o., Za Dráhou 4386/3, Hodonín 69501, Phone +420518340919, <u>chemila@chemila.cz</u> Chemical and Microbiological Laboratory, Testing Laboratory No. 1273 certified by Czech Accreditation Institute according to ČSN EN ISO/IEC 17025.

> Copy No.: 1 Issue No.: 1

# Test report No. D117/2017

# DETERMINATION OF BACTERICIDAL (EN 1040), FUNGICIDAL (EN 1275), TUBERCULOCIDAL (EN 14348), SPORICIDAL (EN 14347) AND VIRUCIDAL (EN 14476+A1) ACTIVITY OF THE PRODUCT **PASDEZ** DETERMINATION OF ALGICIDAL (ČSN EN ISO 8692, TNV 75 7741) ACTIVITY OF THE PRODUCT **PASDEZ**

Sample ID: D117/2017Page: 1Sample name: PASDEZFrom pages: 19Client: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaProducer: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaPage: 1

Incoming date: 12.6.2017

Delivery date:

9.11.2017

Hodonín, 9.11.2017

Ing. Jana Šlitrová, Head of Laboratory

The report may be reproduced only as a whole, in parts only upon written permission of the laboratory. The test results relate only to the samples stated in the Test Report. The Lab does not take any guarantee for the identity of samples not taken by the lab personnel.

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. – 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 2

Subject of testing:

Determination of bactericidal, fungicidal, tuberculocidal, sporicidal, virucidal and algicidal activity of the product.

Identification of the sample:	
Name of the product:	PASDEZ
Batch number:	01.006
Date of manufacture:	12.5.2016
Expiry date:	12.5.2019
Manufacturer:	DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica
	Moldova
Incoming date:	12.6.2017
Storage conditions:	stated by the manufacturer
Active compounds and concentrations:	CAS 51580-86-0 Sodium dichlorisocyanurate, dehydrate 99%
Experimental conditions:	Testing of disinfecting efficiency of chemical disinfecting and antiseptic agents by suspension method

	SOF-W-19-00 (EN 1040.2003	·)				
Period of analysis:	3.10 4.10.2017					
Test temperature:	$20 \degree C \pm 1 \degree C$					
Test method:	dilution neutralization method	l				
Neutralization medium:	Dey-Engley Neutralizing Brot	h M 1062				
Appearance of the product:	Appearance of the product: white tablets					
Test concentration:	2 tablets/10 l ( $m_{tab} = 2.817$ g)					
Product diluent:	distilled water					
Contact time:	30 min					
Interfering substances:	no interfering substance (disti	lled water)				
Test organisms:	Pseudomonas aeruginosa	ATCC 15442				
	Staphylococcus aureus	ATCC 6538				
Incubation conditions:	$37 ^{\circ}\text{C} \pm 1 ^{\circ}\text{C}, 7 \text{ days}$					

Test procedure:

- 1. Preparation of the test suspension
- 2. Preparation of product test solutions
- 3. Quantitative suspension test
- 4. Incubation and calculation
- 5. Expression and interpretation of results

Note:

Bactericidal activity – the capability of a product to produce a reduction in the number of viable bacterial cells of relevant organisms under defined conditions by at least 5 orders ( $10^5$ ).

 $R=N_0\!/~N_a$  = the reduction in viability, or lg R = lg  $N_0-$  lg  $N_a$ 

# The standard:

EN 1040:2005 Chemical disinfectants and antiseptics – Quantitative suspension test for the evaluation of basic bactericidal activity of chemical disinfectants and antiseptics - Test method and requirements (phase 1) December 2005

The Number of CFU in the tested product **PASDEZ**:  $< 10^{1}$  CFU/g

# 1. Testing the efficacy of chemical disinfectant PASDEZ on Pseudomonas aeruginosa ATCC 15442

Tab No. 1.1 Verification of methodology

Validation of suspension (Nv0)			n (N <sub>V0</sub> )	Validation of selected				Neutralizer toxicity control (B)				Method validation (C)			
_			experimental conditions (A)								Product conc.: 2 tabs/101				
V <sub>c1</sub>	38	Ф	- 20.5	V <sub>c1</sub>	30	Ф	- 22	V <sub>c1</sub>	33	Ф	- 25	V <sub>c1</sub>	26	ሐ	- 20.5
V <sub>c2</sub>	41	Ψ	Nvo- 39.3	V <sub>c2</sub>	36	Ψ	$\Psi_{\rm A} = 33$		37	$\Psi_{\rm B} = 55$		V <sub>c2</sub>	33	$\Psi_{\rm C} = 29.3$	
$30 \le \Phi_{Nvo} \le 160$			$\Phi_{A} \ge 0.5 \Phi_{Nvo}$			$\Phi_{\mathbf{B}} \ge 0.5 \ \Phi_{\mathrm{Nvo}}$				$\Phi_{\rm C} \ge 0.5 \ \Phi_{\rm Nvo}$					
х	yes		no	х	yes		no	х	yes		no	х	yes		no

#### Tab No. 1.2 Test suspension

Test suspension N	Ν	V <sub>c1</sub>	V <sub>c1</sub>		Test suspensio	on $N_0$ (time = 0)				
$\Phi = 35.5 \text{ x} 10^7 = 188.55$	10-6	>330	>330		$\lg N_0 = \lg N$	lg 7.55				
$8.17 \le lg N \le 8.70$	10-7	34	37		7.17 ≤ lg	$N_0 \leq$	7.70			
				х	yes		no			

# Tab No. 1.3 Testing the efficacy of chemical disinfectant **PASDEZ** on *Pseudomonas aeruginosa* ATCC 15442

Test concentration	Dilution after test	V <sub>c1</sub>	V <sub>c2</sub>	lg N <sub>a</sub> =	lg R
/contact time (min)	procedure			lg (Φ <sub>a</sub> x 10)	$(\lg N_0 = \lg 7.55)$
2 tabs/101/30	$10^{0}$	<14	<14	< 2.15	≥ 5.40

#### 2. Testing the efficacy of chemical disinfectant PASDEZ on Staphylococcus aureus ATCC 6538

# Tab No. 2.1 Verification of methodology

Validation of suspension $(N_{V0})$			Valio	lation o	f	selected	Neutralizer toxicity control (B)				Met	Method validation (C)			
			experimental conditions (A)							Product conc.: 2 tabs/101					
Vc1	49	$\Phi = 47$	V <sub>c1</sub>	55	Ф	- 17 5	Vc1	39	Ф	- 20.5	V <sub>c1</sub>	52	Ф	- 45	
V <sub>c2</sub>	45	$\Psi_{\rm Nvo}=47$	V <sub>c2</sub>	40	$\Psi_A$	$\Psi_{\rm A} = 47.5$		40	$\Psi_{\rm B} = 39.3$		V <sub>c2</sub>	38	$\Psi_{\rm C} = 43$		
$30 \le \Phi_{Nvo} \le 160$			$\Phi_A \ge$	$\Phi_A \ge 0.5 \Phi_{Nvo}$			$\Phi_{B} \ge 0.5 \Phi_{Nvo}$			$\Phi_{\rm C} \ge 0.5 \ \Phi_{\rm Nvo}$					
х	yes	no	х	yes		no	х	yes		no	х	yes		no	

## Tab No. 2.2 Test suspension

Test suspension N	N	V <sub>c1</sub>	V <sub>c1</sub>		Test suspension $N_0$ (time = 0)						
$\Phi = 48.5 \text{ x } 10^7 = 18 8.69$	10-6	>330	>330		$\lg N_0 = \lg N/10 = \lg 7.69$						
$8.17 \leq lg \ N \leq 8.70$	10-7	56	41		7.17 ≤ lg	7.70					
				х	ves		no				

#### Tab No. 2.3 Testing the efficacy of chemical disinfectant PASDEZ on Staphylococcus aureus ATCC 6538

Test concentration	Dilution after test	V <sub>c1</sub>	V <sub>c2</sub>	lg N <sub>a</sub> =	lg R
/contact time (min)	procedure			lg (Φ <sub>a</sub> x 10)	$(lg N_0 = lg 7.69)$
2 tabs/101/30	$10^{0}$	<14	<14	< 2.15	≥ 5.54

Note:  $V_c$  = value is the number of cfu per ml,  $\Phi$  = average  $V_{c1}$  a  $V_{c2}$  (1. + 2. duplicate  $V_c$  values), N = the number of cfu/ml of the bacterial test suspension,  $N_0$  = the number of cfu/ml of the bacterial test suspension at the beginning of the contact time = 0,  $N_V$  = the number of cfu/ml of the bacterial test suspension for validation  $N_{V0}$  = the number of cfu/ml of the bacterial test suspension for validation in the test mixture, A, B, C at the beginning of the contact time = 0,  $N_a$  = the number of survivors per ml in the test mixture, A, B, C = the number of survivors per ml in control tests (A – experimental conditions control, B – neutralizer toxicity validation, C – method validation), R = N\_0/N\_a = the reduction in viability, or lg R = lg N\_0 – lg N\_a

3. Evaluation of bactericidal activity of the product PASDEZ

Tab No. 3.1 The efficac	y of chemica	l disinfectant PAS	DEZ on test strain	s – bactericidal activity
-------------------------	--------------	--------------------	--------------------	---------------------------

Bactericidal activity of the product (EN 1040:2005)												
Strain	Test	Contact	Product test	Interfering	lg R	lg R						
	temperature	time	concentrations	substances -	ĒN	-						
	[°C]	[min]		conditions	1040:2005							
Pseudomonas aeruginosa ATCC 15442	20	30	2 tabs/101	-	$\geq$ 5	> 5						
Staphylococcus aureus ATCC 6538	20	30	2 tabs/10 1	-	$\geq 5$	> 5						

Note:  $V_c$  = value is the number of cfu per ml,  $\Phi$  = average  $V_{c1}$  a  $V_{c2}$  (1. + 2. duplicate  $V_c$  values), N = the number of cfu/ml of the bacterial test suspension,  $N_0$  = the number of cfu/ml of the bacterial test suspension at the beginning of the contact time = 0,  $N_V$  = the number of cfu/ml of the bacterial test suspension for validation  $N_{V0}$  = the number of cfu/ml of the bacterial test suspension for validation in the test mixture, A, B, C at the beginning of the contact time = 0,  $N_a$  = the number of survivors per ml in the test mixture, A, B, C = the number of survivors per ml in control tests (A – experimental conditions control, B – neutralizer toxicity validation, C – method validation), R = N\_0/N\_a = the reduction in viability, or lg R = lg N\_0 – lg N\_a

Prepared by: Ing. Eva Kremlová, Lab Technician

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. - 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 5

Experimental conditions:	Testing of disinfecting efficiency of chemical disinfecting and antiseptic agents by suspension method
	SOP-M-19-00 (EN 1275:2005)
Period of analysis:	29.9. – 2.10.2017
Test temperature:	$20 \text{ °C} \pm 1 \text{ °C}$
Test method:	dilution neutralization method
Neutralization medium:	Dey-Engley Neutralizing Broth M 1062
Appearance of the product:	white tablets
Product diluent:	distilled water
Test concentration:	2 tablets/10 l ( $m_{tab} = 2.817$ g)
Contact time:	30 min
Interfering substances:	no interfering substance (distilled water)
Test organisms:	Candida albicans ATCC 10231
-	Aspergillus brasiliensis (niger) ATCC 16404
Incubation conditions:	$30^{\circ}C \pm 1^{\circ}C$ , 48 hours and additional period of 24 or 48 hours

Test procedure:

- 1. Preparation of the test suspension
- 2. Preparation of product test solutions
- 3. Quantitative suspension test
- 4. Incubation and calculation
- 5. Expression and interpretation of results

# Note:

Presence of a high concentration (at least 75%) of Aspergillus brasiliensis spiny spores in the test suspension – yes.

Fungicidal activity – the capability of a product to produce a reduction in the number of viable fungi of relevant test organisms under defined conditions by at least 4 orders  $(10^4)$ .

Yeasticidal activity – the capability of a product to produce a reduction in the number of viable vegetative yeast cells of relevant test organisms under defined conditions by at least 4 orders  $(10^4)$ .

 $R=N_0\!/~N_a$  = the reduction in viability, or lg R = lg  $N_0$  – lg  $N_a$ 

The standard:

EN 1275:2005 Chemical disinfectants and antiseptics – Quantitative suspension test for the evaluation of basic fungicidal or basic yeasticidal activity of chemical disinfectants and antiseptics - Test method and requirements (phase 1) December 2005

# 4. Testing the efficacy of chemical disinfectant PASDEZ on Candida albicans ATCC 10231

#### Tab No. 4.1 Verification of methodology

Val	idation of susp	ension (N <sub>v0</sub> )	Valio	lation o	f	selected	Neutralizer toxicity control (B)				Met	Method validation (C)			
			experimental conditions (A)			_				Product conc.: 2 tabs/101					
Vc	24	$\Phi = 30.5$	V <sub>c1</sub>	28	ወ	- 23 5	V <sub>c1</sub>	20	Ф. –	28	V <sub>c1</sub>	23	ወ	- 22	
V <sub>c2</sub>	37	$\Psi_{\text{Nvo}}$ – 50.5	V <sub>c2</sub>	19	$\Psi_{A}$	$\Psi_{\rm A} = 23.3$	V <sub>c2</sub>	36	$\Psi_{\mathbf{B}} = 20$	20	V <sub>c2</sub>	21	$\Psi_{\rm C} = 22$		
$30 \le \Phi_{Nvo} \le 160$			$\Phi_A \ge 0.5 \Phi_{Nvo}$			$\Phi_{B} \ge 0.5 \Phi_{Nvo}$				$\Phi_{\rm C} \ge 0.5 \ \Phi_{\rm Nvo}$					
х	yes	no	х	yes		no	х	yes	n	0	х	yes		no	

#### Tab No. 4.2 Test suspension

· · · · · · · · · · · · · · · · · · ·									
Test suspension N	N	V <sub>c1</sub>	V <sub>c1</sub>		Test suspension $N_0$ (time = 0)				
$\Phi = 169 \text{ x } 10^5 = 107.23$	10-5	164	173	$\lg N_0 = \lg N/10 = \lg 6.23$					
$7.17 \leq lg \ N \leq 7.70$	10-6	14	20	$6.17 \le \lg N_0 \le 6.70$					
				х	yes		no		

Tab No. 4.3 Testing the efficacy of chemical disinfectant PASDEZ on Candida albicans ATCC 10231

Test concentration	Dilution after test	V <sub>c1</sub>	V <sub>c2</sub>	lg N <sub>a</sub> =	lg R
/contact time (min)	procedure			$lg (\Phi_a x 10)$	$(lg N_0 = lg 6.23)$
2 tabs/101/30	$10^{0}$	<14	<14	< 2.15	≥ <b>4.08</b>

5. Testing the efficacy of chemical disinfectant PASDEZ on Aspergillus brasiliensis (niger) ATCC 16404

#### Tab No. 5.1 Verification of methodology

Validation of suspension (Nv0)			Valie	dation of	of	selected	Neu	tralizer toxicit	y cor	ntrol (B)	Method validation (C)				
				experimental conditions (A)							Product conc.: 2 tabs/101				
Vcl	27	а	-205	V <sub>c1</sub>	25		<b>Ф</b> – 22	V <sub>c1</sub>	23	Ф	- 20.5	V <sub>c1</sub>	29	Ф	- 26
Vc	34	ų	$P_{\text{Nvo}} = 50.5$	V <sub>c2</sub>	19		$\Phi_A = 22$	V <sub>c2</sub>	18	$\Phi_{\mathbf{B}} = 20.5$		V <sub>c2</sub>	23	Ψ	c = 20
$30 \le \Phi_{Nvo} \le 160$		$\Phi_{A} \ge 0.5 \Phi_{Nvo}$			$\Phi_{\mathbf{B}} \ge 0.5 \Phi_{\mathrm{Nvo}}$				$\Phi_{\rm C} \ge 0.5 \ \Phi_{\rm Nvo}$						
х	yes		no	х	yes		no	х	yes		no	х	yes		no

#### Tab No. 5.2 Test suspension

Test suspension N	Ν	$V_{c1}$	V <sub>c1</sub>	Test suspension $N_0$ (time = 0)					
$\Phi = 31 \text{ x } 10^6 = 107.49$	10-5	>165	>165	$\lg N_0 = \lg N/10 = \lg 6.49$					
$7.17 \leq lg \ N \leq 7.70$	10-6	34	28	$6.17 \le \lg N_0 \le 6.70$					
				Х	yes		no		

Tab No. 5.3 Testing the efficacy of chemical disinfectant **PASDEZ** on Aspergillus brasiliensis (niger) ATCC 16404

Test concentration	Dilution after test	V <sub>c1</sub>	$V_{c2}$	$lg N_a =$	lg R
/contact time (min)	procedure			$lg (\Phi_a x 10)$	$(lg N_0 = lg 6.49)$
2 tabs/101/30	$10^{0}$	<14	<14	< 2.15	≥ 4.34

Note:  $V_c$  = value is the number of cfu per ml,  $\Phi$  = average  $V_{c1}$  a  $V_{c2}$  (1. + 2. duplicate  $V_c$  values), N = the number of cfu/ml of the fungal test suspension, N<sub>0</sub> = the number of cfu/ml of the fungal test suspension at the beginning of the contact time = 0, N<sub>V</sub> = the number of cfu/ml of the fungal test suspension for validation N<sub>V0</sub> = the number of cfu/ml of the fungal test suspension for validation in the test mixture A, B, C at the beginning of the contact time = 0, A, B, C = the number of survivors per ml in control tests (A – experimental conditions control, B – neutralizer toxicity validation, C – method validation), R = N<sub>0</sub>/N<sub>a</sub> = the reduction in viability, or lg R = lg N<sub>0</sub> – lg N<sub>a</sub>

## 6. Evaluation of fungicidal activity of the product PASDEZ

Tab No. 6.1 The efficacy of chemical disinfectant <b>PASDEZ</b> on test strains – fungicidal activ
--

Fungicidal activity of the product (EN 1275:2005)												
Strain	Test	Contact	Product test	Interfering	lg R	lg R						
	temperature	time	concentrations	substances -	EN							
	[°C]	[min]		conditions	1275:2005							
Candida albicans ATCC 10231	20	30	2 tabs/101	-	$\geq 4$	>4						
Aspergillus brasiliensis (niger) ATCC 16404	20	30	2 tabs/10 1	-	$\geq 4$	> 4						

Note:  $V_c$  = value is the number of cfu per ml,  $\Phi$  = average  $V_{c1}$  a  $V_{c2}$  (1. + 2. duplicate  $V_c$  values), N = the number of cfu/ml of the fungal test suspension,  $N_0$  = the number of cfu/ml of the fungal test suspension at the beginning of the contact time = 0,  $N_V$  = the number of cfu/ml of the fungal test suspension for validation  $N_{V0}$  = the number of cfu/ml of the fungal test suspension for validation in the test mixture A, B, C at the beginning of the contact time = 0, A, B, C = the number of survivors per ml in control tests (A – experimental conditions control, B – neutralizer toxicity validation, C – method validation), R = N\_0/N\_a = the reduction in viability, or lg R = lg N\_0 – lg N\_a

Prepared by: Ing. Eva Kremlová, Lab Technician

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. - 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 8

Experimental conditions:	Testing of disinfecting efficiency of chemical disinfecting and
	antiseptic agents by suspension method
	SOP-M-19-00 (EN 14348:2005)
Period of analysis:	15.8 5.9.2017
Test temperature:	$20 ^{\circ}\text{C} \pm 1 ^{\circ}\text{C}$
Test method:	membrane filtration method
Filtration diluent:	rinsing liquid
Appearance of the product:	white tablets
Product diluent:	hard water
Test concentration:	2 tablets/10 l ( $m_{tab} = 2.817$ g)
Contact time:	30 min
Interfering substances:	0.3 g/l BSA (clean conditions)
Test organisms:	Mycobacterium terrae ATCC 15755
Incubation conditions:	$37 \text{ °C} \pm 1 \text{ °C}, 21 \text{ days}$
Test procedure:	
1. Preparation of test suspension	

- 2. Preparation of product test solutions
- 3. Quantitative suspension test
- 4. Incubation and calculation
- 5. Expression and interpretation of results

### Note:

Mycobactericidal activity – the capability of a product to produce a reduction in the number of viable cells of *Mycobacterium terrae* and *Mycobacterium avium* under defined conditions by at least 4 orders (10<sup>4</sup>). Tuberculocidal activity - the capability of a product to produce a reduction in the number of viable cells of *Mycobacterium terrae* under defined conditions by at least 4 orders (10<sup>4</sup>).  $R = N_0 / N_a$  nebo lg  $R = \log N_0 - \log N_a$  the reduction in viability

#### The standard:

EN 14348:2005 Chemical disinfectants and antiseptics – Quantitative suspension test for the evaluation of mycobactericidal activity of chemical disinfectants in the medical area including instrument disinfectants - Test method and requirements (phase 2, step 1) January 2005

# 7. Testing the efficacy of chemical disinfectant PASDEZ on Mycobacterium terrae ATCC 15755

#### Tab No. 7.1 Verification of methodology, clean conditions

Validation of suspension (N <sub>V0</sub> )			Vali	dation c	f	selected	Men	nbrane filtratio	on va	lidation	Method validation (C)						
				experimental conditions (A)			(B)				Product conc.: 2 tabs/101						
V <sub>c1</sub>	159	ወ	- 159 5	V <sub>c1</sub>	167	ወ	- 160	V <sub>c1</sub>	147	$\Phi_{\rm B} = 151.5$		$\Phi_{-} = 151.5$		V <sub>c1</sub>	162	ወ	- 156
V <sub>c2</sub>	160	$\Psi$	$N_{VO} = 139.3$	$V_{c2}$	153	Ψ	A = 100	$V_{c2}$	156			V <sub>c2</sub> 150		$\Psi_{\rm C} = 150$			
$30 \le \Phi_{\text{Nvo}} \le 160$		$\Phi_{A} \ge 0.5 \Phi_{Nvo}$			$\Phi_{\mathbf{B}} \ge 0.5 \Phi_{\mathrm{Nvo}}$			$\Phi_{\rm C} \ge 0.5 \ \Phi_{\rm Nvo}$									
х	yes		no	х	yes		no	Х	yes		no	х	yes		no		

# Tab No. 7.2 Test suspensions

1									
Test suspension N	Ν	$V_{cl}$	V <sub>c1</sub>		(time = 0)				
$\Phi = 156 \text{ x } 10^7 = \log 9.19$	10-7	163	150	$\lg N_0 = \lg N/10 = \lg 8.19$					
$9.17 \le lg \ N \le 9.70$	10-8	15	16	$8.17 \le \lg N_0 \le 8.70$					
				х	yes		no		

Tab No. 7.3 Testing the efficacy of chemical disinfectant PASDEZ on Mycobacterium terrae ATCC 15755

U			2		
Test concentration / contact	Dilution after	$V_{c1}$	$V_{c2}$	lg N <sub>a</sub> =	lg R
time (min)/ conditions	test procedure			lg (Φ <sub>a</sub> x 10)	$(lg N_0 = lg 8.19)$
2 tabs/101/30/clean	10-1	22	52	3.57	4.62

8. Evaluation of tuberculocidal activity of the product PASDEZ

Tab No. 8.1 The efficacy of chemical disinfectant PASDEZ on test strain - tuberculocidal activity

Tuberculocidal activity of the product (EN 14348:2005)											
Strain	Test	Contact	Product test	Interfering	lg R	lg R					
	temperature	time	concentrations	substances -	ĒN	_					
	[°C]	[min]		conditions	14348:2005						
Mycobacterium terrae ATCC 15755	20	30	2 tabs/101	clean	$\geq 4$	>4					

Note:  $V_c$  = value is the number of cfu per ml,  $\Phi$  = average  $V_{c1}$  a  $V_{c2}$  (1. + 2. duplicate  $V_c$  values), N = the number of cfu/ml of the test suspension, N<sub>0</sub> = the number of cfu/ml of the test suspension at the beginning of the contact time (time "0"), N<sub>a</sub> = the number of survivors per ml in the test mixture at the end of the contact time and before the membrane filtration, N<sub>v</sub> = the number of cfu/ml of the test suspension for validation, N<sub>v0</sub>= the number of cfu/ml of the test suspension in the mixture A,B,C at the beginning of the contact time (time "0"), A,B,C = the number of survivors per ml in control tests (A – experimental conditions control, B – membrane filtration validation, C – method validation), R = N<sub>0</sub> / N<sub>a</sub> nebo lg R = lg N<sub>0</sub> – lg N<sub>a</sub> the reduction in viability

Prepared by: Ing. Eva Kremlová, Lab Technician

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. - 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 10

Experimental conditions:	Testing of disinfecting efficiency of chemical disinfecting and antiseptic agents by suspension method SOP-M-19-00 (EN 14347:2005)
Period of analysis:	13.10 18.10.2017 (B.s.) $20^{\circ}C + 1^{\circ}C$
Test method:	dilution neutralization method
Neutralization medium:	Dey-Engley Neutralizing Broth M 1062
Appearance of the product:	white tablets
Product diluent:	distilled water
Test concentration:	4 tablets/101 ( $m_{tab} = 2.817$ g)
Contact time:	30 min
Interfering substances:	no interfering substance (distilled water)
Test organisms:	Bacillus subtilis ATCC 6633
Incubation conditions:	37 °C $\pm$ 1 °C, minimum 4 and maximum 7 days

Test procedure:

- 1. Preparation of the test suspension
- 2. Preparation of product test solutions
- 3. Quantitative suspension test
- 4. Incubation and calculation
- 5. Expression and interpretation of results

#### Note:

Sporicidal activity – the capability of a product to produce a reduction in the number of bacterial spores belonging to reference strain of *Bacillus subtilis* and *Bacillus cereus* under defined conditions by at least 4 orders (10<sup>4</sup>).  $R = N_w / N_a$  nebo lg  $R = lg N_w - lg N_a$  the reduction in viability

# The standard:

EN 14347:2005 Chemical disinfectants and antiseptics - Basic sporicidal activity - Test method and requirements (phase 1, step 1) January 2005

# 9. Testing the efficacy of chemical disinfectant PASDEZ on Bacillus subtilis ATCC 6633

rad No. 9.1 vernication of methodology											
Test suspension N1 Validation suspension Nv			Neutralize	Neutralizer control (B) Method validation (C			lidation (C)				
									Product conc. 4 tabs/101		
Dilution	V <sub>c1</sub>	V <sub>c2</sub>	Dilution	V <sub>c1</sub>	V <sub>c2</sub>	Dilution	10-6	10-6	Dilution	10-3	10-3
10-6	>330	>330	10-2	>330	>330	Vcl	54	$\Phi_{\mathbf{B}} =$	Vc1	38	$\Phi_{\rm C} =$
10-7	57	62	10-3	56	50	$V_{c2}$	49	51.5	V <sub>c2</sub>	45	41.5
lg N1	59.5 x 10	<sup>7</sup> = lg 8.77	lg Nv	$1g Nv$ 53 x $10^3 = 1g 4.72$		lg B	$51.5 \times 10^6 = \lg 7.71$		lg C	Ig C 41.5 x 10 <sup>3</sup> = 1g 4.62	
Norm	$8.48 \le \lg$	$N1 \le 9.00$	Norm	Norm $4.48 \le \lg Nv \le 5.00$		Norm	lg B≥lg Nw		Norm $4.48 \le \lg C \le 5.00$		
Test susper	nsion N2		Water cont	rol Nw		ONT (original neutralization T			The weighted mean count - quotient		
						tube)			Φ		
Dilution	V <sub>c1</sub>	V <sub>c2</sub>	Dilution	V <sub>c1</sub>	V <sub>c2</sub>				N	Norm	Φ
100	>330	>330	10-5	>330	>330				N1	$5 \le \Phi \le 15$	-
10-1	55	65	10-6	51	47				N2	$5 \le \Phi \le 15$	-
lg N2	60 x 10 <sup>1</sup>	= 1g 2.78	lg Nw	$49 \ge 10^6 = 107.69$		Percept	Visible gro	owth	Nv	$5 \le \Phi \le 15$	-
Norm	$2.48 \le \lg$	$N2 \le 3.00$	Norm	$7.48 \le \lg 1$	$Nw \le 8.00$	Norm Visible growth		owth	Nw	$5 \le \Phi \le 15$	-

# Tab No. 9.1 Verification of methodology

#### Tab No. 9.2 Testing the efficacy of chemical disinfectant PASDEZ on Bacillus subtilis ATCC 6633

The resting the entered of enemietal disinfectant right and bucknus submits rife e obss										
Test concentration (%) /	Dilution after test	V <sub>c1</sub>	$V_{c2}$	$lg N_a =$	lg R					
contact time (min)	procedure			$lg (\Phi_a \ge 10)$	$(lg N_w = lg 7.69)$					
4 tabs/101/30	10-1	40	56	3.68	4.01					

# 10. Evaluation of sporicidal activity of the product PASDEZ

# Tab No. 10.1 The efficacy of chemical disinfectant **PASDEZ** on test strains – sporicidal activity

Sporicidal activity of the product (EN 14347:2005)										
Strain	Test	Contact	Product test	Interfering	lg R	lg R				
	temperature	time	concentrations	substances -	EN 14347:2005					
	[°C]	[min]		conditions						
Bacillus subtilis	20	30	4 tabs/101	distilled water	$\geq 4$	>4				
ATCC 6633										

Note:  $V_c$  = value is the number of cfu per ml,  $\Phi$  = average  $V_{c1}$  a  $V_{c2}$  (1. + 2. duplicate  $V_c$  values), N1 = the number of cfu/ml of the bacterial test suspension, N2 = the number of cfu/ml of the bacterial test suspension after dilution,  $N_v$  = the number of cfu/ml of the bacterial test suspension for validation,  $N_a$  = the number of survivors per ml in the test mixture at the end of the contact time,  $N_w$  = the number of cfu/ml of the bacterial test suspension in water control, B and C = the number of survivors per ml in control tests (B – neutralizer control, C – method validation),  $R = N_w / N_a$  nebo lg R = lg  $N_w$  – lg  $N_a$  the reduction in viability

Prepared by: Mgr. Mirka Horáková, Ph.D., Lab Technician

Sample ID: D117/2017 Sampling date: 8.6.2017 Rep No: 152 Sample delivered: 12.6.2017 Sample name: PASDEZ Testing date: 15.8. - 31.10.2017 Delivered amount: 2 x 500 g Sampled: by client Sampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica Moldova Client DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica Moldova Batch No: 01.006 Page: 12

Experiment conditions:	<b>Testing of disinfecting efficiency of chemical disinfecting and antiseptic agents by suspension method</b> SOP-M-19-00 (EN 14476:2013 +A1:2015)
Period of analysis:	19.9 - 26.9.2016
Test temperature:	$20 \degree C \pm 1 \degree C$
Method of titration:	virus titration on monolayers of cells on microtitre plates
Appearance of the product:	white tablets
Product diluent:	distilled water
Test concentration:	2 tablets/10 1 ( $m_{tab} = 2.817 \text{ g}$ )**
Contact time:	30 min
Interfering substances:	0.3 g/l BSA (clean conditions)
Reference product:	Formaldehyde 36 – 38% solution p.a., CAS: 50-00-0, Batch No:
	K47740803613, expiry date: 31.3.2018
Test virus:	Adenovirus type 5, strain Adenoid 75, ATCC VR-5 (5th passage)
Cell lines:	HeLa cells
Incubation:	36 °C $\pm$ 1 °C, 5 % CO <sub>2</sub> , 96 h, and additional period of 72 hours. After
• • • • • • • • • • • • •	

incubation, the titre infectivity is calculated according to Spearman-Kärber method. Preparation of the test

- 1. Determination of the number of the microorganisms CFU/ml in the product
- Preparation of the cell culture
  Preparation of the test virus suspension
- 4. Test of the viral infectivity
- 5. Virus titration with the interfering substance
- 6. Cytotoxicity of the product
- 7. Reference virus inactivation test
- 8. Test procedure for the virucidal activity of the product

#### Note:

Virucidal activity – the capability of a product to produce a reduction in the number of infectious virus particles under defined conditions by at least 4 (lg) orders.

\*\*The test was performed by using MicroSpin<sup>TM</sup> S 400 HR.

# The standard:

EN 14476:2013 +A1:2015 Chemical disinfectants and antiseptics - Quantitative suspension test for the evaluation of virucidal activity in the medical area - Test method and requirements (Phase 2/Step 1) August 2013 + September 2015

Sample ID: D117/2017	Sampling date: 8.6.2017
Rep No: 152	Sample delivered: 12.6.2017
Sample name: PASDEZ	Testing date: 15.8. – 31.10.2017
Sampled: by client	Delivered amount: 2 x 500 g
Sampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap.	3, Chisinau, Republica Moldova
Client DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisina	au, Republica Moldova
Batch No: 01.006	Page: 13

11. Testing the efficacy of chemical disinfectant **PASDEZ** on *Adenovirus* type 5, strain Adenoid 75, ATCC VR-5\*\*

Tab No. 11.1 Table of results of product PASDEZ on Adenovirus type 5, strain Adenoid 75, ATCC VR-5

Product	Concentration**	Interfering	Level of	- log <sub>10</sub> TCID <sub>50</sub> after 30 min	- log <sub>10</sub> TCID <sub>50</sub> after 60
		substances	cytoxicity		min
PASDEZ	2 tabs/10 1	clean	$\le 2.50$	4.50	-
Formaldehyde	0.7 % (w/v)	PBS	≤ 1.50	6.33	5.00
			Virus titration,		
			time $= 0$		
Virus control	-	PBS	9.50	9.50	9.33
Virus control	-	clean	9.50	9.50	-

Tab No. 11.2 Testing the efficacy of chemical disinfectant **PASDEZ** on *Adenovirus* type 5, strain Adenoid 75, ATCC VR-5

Test concentration**	Titre of the virus	Interfering	Contact time	- log10 TCID50 after	$\Delta \log_{10} TCID_{50}$
	suspension	substances		test procedure	-
	- log <sub>10</sub> TCID <sub>50</sub>			-	
2 tabs/101	9.50	clean	30 min	4.50	5.00

12. Evaluation of virucidal activity of the product PASDEZ

Tab No. 12.1 The efficacy of chemical disinfectant **PASDEZ** on test viruses – virucidal activity

Virucidal activity of the product (EN 14476:2013+A1:2015)									
Strain	Test temperature [°C]	Contact time [min]	Product test concentrations**	Interfering substances - conditions	Δlog <sub>10</sub> TCID <sub>50</sub> EN 14476:2013+ A1:2015	$\Delta \log_{10} \mathrm{TCID}_{50}$			
Adenovirus type 5, strain Adenoid 75, ATCC VR-5**	20	30	2 tabs/101	clean	≥ 4	>4			

Note:

 $TCID_{50}$ - 50% infecting dose of a virus suspension or that dilution of the virus suspension that induce a CPE in 50% of cell culture units

\*\*The test was performed by using MicroSpin<sup>TM</sup> S 400 HR.

Prepared by: Bc. Iva Čížová, Lab Technician

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. - 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 14

Experimental conditions:	Testing of disinfecting efficiency of chemical disinfecting and antiseptic agents by suspension method SOP-M_19-00 (EN 14347-2005)
Period of analysis:	26.10 31.10.2017 (B.c.) $20 ^{\circ}\text{C} + 1 ^{\circ}\text{C}$
Test method:	dilution neutralization method
Neutralization medium:	Dey-Engley Neutralizing Broth M 1062
Appearance of the product:	white tablets
Product diluent:	distilled water
Test concentration:	4 tablets/101 ( $m_{tab} = 2.817$ g)
Contact time:	30 min
Interfering substances:	no interfering substance (distilled water)
Test organisms:	Bacillus cereus ATCC 12826
Incubation conditions:	37 °C $\pm$ 1 °C, minimum 4 and maximum 7 days

Test procedure:

- 1. Preparation of the test suspension
- 2. Preparation of product test solutions
- 3. Quantitative suspension test
- 4. Incubation and calculation
- 5. Expression and interpretation of results

#### Note:

Sporicidal activity – the capability of a product to produce a reduction in the number of bacterial spores belonging to reference strain of *Bacillus subtilis* and *Bacillus cereus* under defined conditions by at least 4 orders (10<sup>4</sup>).  $R = N_w / N_a$  nebo lg  $R = lg N_w - lg N_a$  the reduction in viability

# The standard:

EN 14347:2005 Chemical disinfectants and antiseptics - Basic sporicidal activity - Test method and requirements (phase 1, step 1) January 2005

13. Testing the efficacy of chemical disinfectant PASDEZ on Bacillus cereus ATCC 12826

1 ad INO. 15.1 Verification of methodology												
Test suspension N1 Validation suspension Nv			Neutralize	Neutralizer control (B) Method validation (C)								
-				-					Product conc. 4 tabs/101			
Dilution	V <sub>c1</sub>	V <sub>c2</sub>	Dilution	$V_{c1}$	$V_{c2}$	Dilution	10-6	10-6	Dilution	10-3	10-3	
10-6	>330	>330	10-2	>330	>330	Vcl	67	<b>Ф</b> 75	Vcl	24	<b>Ф</b> . – 27	
10-7	54	40	10-3	77	48	V <sub>c2</sub>	83	$\Phi_{\mathbf{B}} = 73$	V <sub>c2</sub>	50	$\Psi C = 57$	
lg N1	47 x 10 <sup>7</sup>	= lg 8.67	lg Nv	Nv $62.5 \times 10^3 = 1g 4.80$		lg B	$46 \ge 10^6 = 197.88$		lg C 37 x 10 <sup>3</sup> = $lg 4.57$			
Norm	$8.48 \le \lg 1$	$N1 \le 9.00$	Norm	$4.48 \le \lg 1$	$Nv \le 5.00$	Norm	lg B≥lg Nw		Norm $4.48 \le \lg C \le 5.00$			
Test susper	nsion N2		Water cont	rol Nw	l Nw		ONT (original neutralization			The weighted mean count - quotient		
						tube)			Φ			
Dilution	V <sub>c1</sub>	V <sub>c2</sub>	Dilution	V <sub>c1</sub>	$V_{c2}$				N	Norm	Φ	
100	>330	>330	10-5	>330	>330				N1	$5 \le \Phi \le 15$	-	
10-1	49	56	10-6	55	62				N2	$5 \le \Phi \le 15$	-	
1g N2	52.5 x 10 <sup>1</sup>	$^{1} = lg 2.72$	lg Nw	$58.5 \ge 10^6 = 197.77$		Percept	Visible gro	owth	Nv	$5 \le \Phi \le 15$	-	
Norm	$2.48 \le \lg 1$	$N2 \le 3.00$	Norm	$7.48 \le \lg 1$	$Nw \le 8.00$	Norm Visible growth		owth	Nw	$5 \le \Phi \le 15$	-	

# Tab No. 13.1 Verification of methodology

#### Tab No. 13.2 Testing the efficacy of chemical disinfectant PASDEZ on Bacillus cereus ATCC 12826

Test concentration/ contact	Dilution after test	V <sub>c1</sub>	$V_{c2}$	$lg N_a =$	lg R						
time (min)	procedure			$lg (\Phi_a \ge 10)$	$(lg N_w = lg 7.77)$						
4 tabs/101/30	10-2	105	114	5.04	2.73						

14. Evaluation of sporicidal activity of the product PASDEZ

Tab No. 14.1 The efficacy of chemical disinfectant PASDEZ on test strains	s – sporicidal :	activity
---	------------------	----------

Sporicidal activity of the product (EN 14347:2005)							
Strain	Test	Contact	Product test	Interfering	lg R	lg R	
	temperature	time	concentrations	substances -	EN 14347:2005		
	[°C]	[min]		conditions			
Bacillus cereus	20	30	4 tabs/101	distilled water	$\geq 4$	< 4	
ATCC 12826							

Note:  $V_c$  = value is the number of cfu per ml,  $\Phi$  = average  $V_{c1}$  a  $V_{c2}$  (1. + 2. duplicate  $V_c$  values), N1 = the number of cfu/ml of the bacterial test suspension, N2 = the number of cfu/ml of the bacterial test suspension after dilution,  $N_v$  = the number of cfu/ml of the bacterial test suspension for validation,  $N_a$  = the number of survivors per ml in the test mixture at the end of the contact time,  $N_w$  = the number of cfu/ml of the bacterial test suspension in water control, B and C = the number of survivors per ml in control tests (B – neutralizer control, C – method validation),  $R = N_w / N_a$  nebo lg R = lg  $N_w$  – lg  $N_a$  the reduction in viability

Prepared by: Mgr. Mirka Horáková, Ph.D., Lab Technician

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. – 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 16

Experimental conditions:	Freshwater algae growth inhibition test			
Period of analysis:	23.10. – 28.10.2016			
Test temperature:	$30 ^{\circ}\text{C} \pm 2 ^{\circ}\text{C}$			
Test method:	micromethod of algal growth inhibition test			
Spectrophotometer:	Reader SpectraMAX PLUS 384			
Wavelength:	670 nm			
Product diluent:	distilled water			
Appearance of the product:	white tablets			
Test concentration:	$4 \text{ tabs/1 } \text{m}^3$			
Contact time:	5 days			
Test organisms:	Parachlorella kessleri FOTT et NOVÁKOVÁ LARG/1			

Test procedure:

- 1. Preparation of algal test suspension
- 2. Counting of test suspension
- 3. Quantitative algal test

# Note:

Algicidal activity (%) =  $((A_0 - A_V)/A_0)$ . 100

 $A_0$  – absorbtion of algal test suspension,  $A_V$  – absorbtion of the solution of the product and algal test suspension. The product is efficient when algicidal activity > 50%

The standard:

ČSN EN ISO 8692 Water quality - Freshwater algal growth inhibition test with unicellular green algae. August 2012

TNV 75 7741 Micromethod of algal growth inhibition test, 1995

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. – 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 17

15. Evaluation of the algicidal activity of chemical disinfectant PASDEZ

Tab No. 15 Testing the efficacy of chemical disinfectant PASDEZ on Parachlorella kessleri FOTT et NOVÁKOVÁ LARG/1

Contact time (days)	Algicidal activity % for concentration	
	$4 \text{ tabs/1 } \text{m}^3$	
1	47.7	
2	74.4	
3	87.5	
4	95.8	
5	96.5	

The product is efficient when algicidal activity > 50%

Prepared by: Mgr. Alena Rýdlová, Lab Technician

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. – 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 18

Interpretation:

Results of tests are in Tabs.

The tested product **PASDEZ**, batch No. 01.006, in the concentration 2 tablets/10 l, diluted in distilled water, in the contact time 30 min at temperature 20 °C  $\pm$  1 °C by the dilution neutralization method **decreased** the number of alive microbes *Pseudomonas aeruginosa* ATCC 15442, *Staphylococcus aureus* ATCC 6538 by at least 5 (lg) orders (EN 1040:2005).

The tested product **PASDEZ**, batch No. 01.006, in the concentration 2 tablets/10 l, diluted in distilled water, in the contact time 30 min at temperature 20 °C  $\pm$  1 °C by the dilution neutralization method **decreased** the number of alive microbes *Candida albicans* ATCC 10231 and *Aspergillus brasiliensis (niger)* ATCC 16404 by at least 4 (lg) orders (EN 1275:2005).

The tested product **PASDEZ**, batch No. 01.006, in the concentration 2 tablets/10 l, diluted in hard water, and in the contact time 30 min under clean conditions at temperature 20 °C  $\pm$  1 °C by the membrane filtration method **decreased** the number of alive microbes *Mycobacterium terrae* ATCC 15755 by at least 4 (lg) orders (EN 14348:2005).

The tested product **PASDEZ**, batch No. 01.006, in the concentration 4 tablets/10 l, diluted in distilled water, in the contact time 30 min at temperature 20 °C  $\pm$  1 °C by the dilution neutralization method **decreased** the number of alive microbes *Bacillus subtilis* ATCC 6633 by at least 4 (lg) orders (EN 14347:2005).

According to the EN 14476:2013 +A1:2015 the tested product **PASDEZ**, batch No. 01.006, in the concentration 2 tablets/10 1\*\*, diluted in hard water, and in the contact time 30 min under clean conditions at temperature 20 °C  $\pm$  1 °C **proved** by the method of virus titration on monolayers of cells on microtitre plates to reduce the number of infectious *Adenovirus* type 5, strain Adenoid 75, ATCC VR-5 particles under defined conditions by 4 (lg) orders.

\*\*The test was performed by using MicroSpin<sup>TM</sup> S 400 HR.

The tested product **PASDEZ**, batch No. 01.006, in the concentration 4 tablets/10 l, diluted in distilled water, in the contact time 30 min at temperature 20 °C  $\pm$  1 °C by the dilution neutralization method **did not decrease** the number of alive microbes *Bacillus cereus* ATCC 12826 by at least 4 (lg) orders (EN 14347:2005).

According to ČSN EN ISO 8692:2012 and TNV 75 7741:1995the tested product **PASDEZ**, batch No. 01.006, in the concentration 4 tabs/1 m<sup>3</sup>, diluted in distilled water, by the micromethod of algal growth inhibition test at temperature 30 °C  $\pm$  2 °C **proved** to decrease the number of alive cells *Parachlorella kessleri* FOTT et NOVÁKOVÁ LARG/1 by 50% since the second day.

Sample ID: D117/2017Sampling date: 8.6.2017Rep No: 152Sample delivered: 12.6.2017Sample name: PASDEZTesting date: 15.8. – 31.10.2017Sampled: by clientDelivered amount: 2 x 500 gSampling point: DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaClient DEZFARMTEH SRL, Mihai Eminescu 30 ap. 3, Chisinau, Republica MoldovaBatch No: 01.006Page: 19

Conclusion:

The product **PASDEZ** is capable of reducing the number of viable bacterial and mycobacterial cells, vegetative yeast cells and mould spores of the relevant organisms under defined conditions to the declared values, and consequently, may be called bactericidal, tuberculocidal and fungicidal.

The product **PASDEZ** is capable of reducing the number of bacterial spores of *Bacillus subtilis* under defined conditions to the declared values, and consequently, may be called sporicidal on *Bacillus subtilis*.

The product **PASDEZ** is not capable of reducing the number of bacterial spores of *Bacillus cereus* under defined conditions to the declared values, and consequently, cannot be called sporicidal on *Bacillus cereus*.

The product **PASDEZ** is capable of reducing the number of infectious *Adenovirus* particles under defined conditions to the declared values, and consequently, may be called virucidal on *Adenovirus*.

The product **PASDEZ** is capable of reducing the number of viable algae cells of the relevant organisms under defined conditions to the declared values, and consequently, may be called algicidal.

9.11.2017, Hodonín

Ing. Barbora Stoklásková, Leader of Study